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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/026,690

12/27/2001

Stefaan De Cnodder

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04/03/2006

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EXAMINER

PHAM, TITO QUANG

ART UNIT

PAPER NUMBER

2616

DATE MAILED: 04/03/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

<b>Office Action Summary</b>	<b>Application No.</b> 10/026,690	<b>Applicant(s)</b> DE CNODDER ET AL.	
	<b>Examiner</b> Tito Pham	<b>Art Unit</b> 2616	

**-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --**

**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 19 December 2005.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-15 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-15 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 12/27/2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All    b) ☐ Some \*    c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

### DETAILED ACTION

1. The disclosure is objected to because of the following informalities:  
reference to claim in the specification. The references to claims in page 1 lines 1-2; page 2 lines 7-8, 25, 32; page 3 lines 4, 8 should be deleted.

Appropriate correction is required.

2. Claims 7 and 14 are objected to because of the following informalities:  
wrong wording. The pre-assigned priority disclosed in the specification and claims 7 and 14 should be "type of service" not "type of sender." Appropriate correction is required.

### ***Claim Rejections - 35 USC § 112***

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. Claims 2 and 9 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

In claims 2 and 9, Applicant states that determination packet marking additionally based on at least one pre-assigned priority which has a separated threshold value assigned to said traffic reservation parameter.

This said traffic reservation parameter claim contradicts with the preamble of the independent claim 1, the specification, and the drawing. As

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disclosed in the specification and the drawing, each pre-assigned priority (green and yellow) has its own bucket, and each bucket has one threshold. The term "said traffic reservation parameter" in claim 2 implies there is at least another threshold in the same bucket. Therefore, claims 2 and 9 are being infinite according to 35 U.S.C. 112, second paragraph.

***Claim Rejections - 35 USC § 103***

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

7. Claims 1, 3, 5-8, 10, 12-15 are rejected under 35 U.S.C. 103(a) as being unpatentable over Troxel (US Pat. 6,147,970) in view of Wang et al. (US Pat. 6,748,435) (hereinafter Wang).

- With respect to claims 1, 8, and 15 Troxel discloses a marking determining method, for determining a packet marking of packets of an incoming packet-flow, in order to keep said packets in conformance with a traffic policy, said determining being based on an actual value of a traffic reservation parameter, said traffic reservation parameter being a measure of available network resources dedicated to packets of said incoming packet-flow having a pre-assigned priority, said determining further being based on said pre-assigned priority of said packets of said incoming packet flow, said traffic reservation parameter having a predetermined minimum and a maximum value, said marking method comprising:

- a) holding a threshold value (figure 10 reference 71) for said traffic reservation parameter (figure 10 reference 70), said threshold value lying between said minimum and said maximum value of said traffic reservation parameter;
- c) determining said packet marking of each of said packets based on said actual value of said traffic reservation parameter when said actual value of said traffic reservation parameter exceeds said threshold value for said traffic reservation parameter (column 17 lines 22-26. When a number of tokens are above the priority upgrade line (threshold), the non-conforming packet is marked to conforming).

Troxel does not disclose b) metering said actual value of said traffic reservation parameter. However, Wang teaches measuring the token bucket level (claim 1 3<sup>rd</sup> element, token level indicator). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to include in Troxel a token bucket level measurement for the purpose of determining whether to mark/remark packet based on the available bandwidth (bucket level).

- With regard to claims 3 and 10, all limitations of parent claims are disclosed above. Troxel further discloses the reservation traffic parameter is the filling level of a token bucket (figures 9 and 10); Wang (figure 6 r bits/sec).
- With regard to claims 5 and 12, all limitations of parent claims are disclosed above. Wang further discloses the pre-assigned priority is a packet loss priority (column 2 lines 59-61).
- Regarding claims 6 and 13, all limitations of parent claims are disclosed above. Troxel further discloses the pre-assigned priority is the packet traffic category (column 2 lines 45-49).
- Regarding claims 7 and 14, all limitations of parent claims are disclosed above, Wang further discloses the pre-assigned priority is a type of service (column 3 lines 7-13).

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8. Claims 4 and 11 are rejected under 35 U.S.C. 103(a) as being unpatentable over Troxel (US Pat. 6,147,970) in view of Wang et al. (US Pat. 6,748,435) (hereinafter Wang) in view of Chang et al. (US Pat. 5,367,523) (hereinafter Chang).

- Regarding claims 4 and 11, all limitations of parent claims are disclosed above. Troxel and Wang do not teach the reservation traffic parameter is the sending rate estimate. However, Chang disclose the sending rate is used as the green token source rate (column 9 lines 22-27). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to have the reservation traffic parameter as the sending rate estimate for the purpose of controlling the congestion in the communication network.

### ***Conclusion***

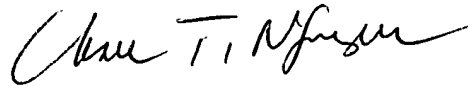
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Tito Pham whose telephone number is 571-272-8617. The examiner can normally be reached on 9-6 PM M-F.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Chau Nguyen can be reached on 571-272-3126. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

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